

(19) World Intellectual Property  
Organization  
International Bureau



(43) International Publication Date  
30 June 2005 (30.06.2005)

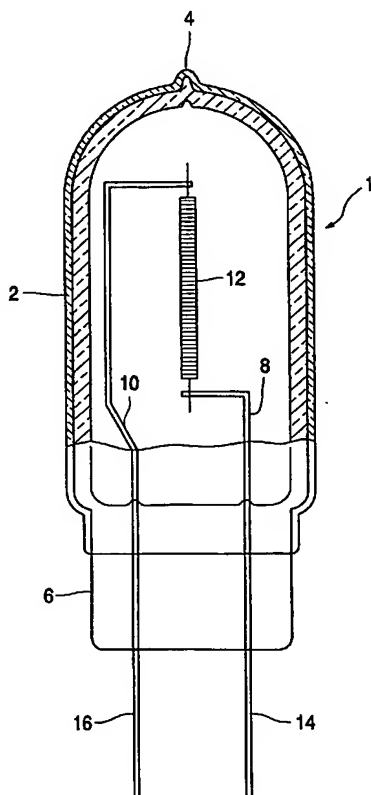
PCT

(10) International Publication Number  
**WO 2005/059950 A2**

- (51) International Patent Classification<sup>7</sup>: **H01K 9/00**
- (21) International Application Number:  
PCT/IB2004/052597
- (22) International Filing Date:  
30 November 2004 (30.11.2004)
- (25) Filing Language: English
- (26) Publication Language: English
- (30) Priority Data:  
03104731.9 16 December 2003 (16.12.2003) EP
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- (81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM,

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(54) Title: ELECTRIC INCANDESCENT LAMP AND METHOD FOR FABRICATION THEREOF



(57) Abstract: The present invention provides a method of fabricating an electric incandescent lamp with improved mechanical stability of its filament, the method comprising the steps of: coiling a first coil of a wire having diameter  $d$  around a first mandrel having diameter  $M1$  with a first pitch and a first number of turns; winding said first coil around a second mandrel having diameter  $M2$  with a second pitch and a second number of turns to form a coiled coil filament; mounting and arranging the coiled coil filament within a light permeable envelope; hermetically sealing said envelope, heating the coiled coil filament above its recrystallization temperature within the envelope for recrystallization of said coiled coil. The primary and secondary winding preferably have primary and secondary mandrel-to-wire ratios  $Y1$  and  $Y2$ , wherein  $Y1 = M1/d \geq 3$  and  $Y2 = M2/(M1+2d) > 3$ . The method according to the present invention enables a further reduction of the length of the coiled coil filament, thus reducing the mechanical stresses caused by gravity in a horizontal burning position and thus improving the structural rigidity of the coiled coil filament.



TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

- (84) **Designated States** (*unless otherwise indicated, for every kind of regional protection available*): ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

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- *as to applicant's entitlement to apply for and be granted a patent (Rule 4.17(ii)) for the following designations* AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA,

MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VC, VN, YU, ZA, ZM, ZW, ARIPO patent (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG)

**Published:**

- *without international search report and to be republished upon receipt of that report*

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